

GOLF PUTTER AND TRAINING APPARATUS AND METHOD

Field of the Invention

This invention relates a golf putter and a golf putting training apparatus which resides at a first end proximal and in contact with the golfer's neck with the putting swing correctly completed when the apparatus first end continues proximal and in contact with the neck at the conclusion of the swing. The invention, more particularly demonstrates an incorrect swing when the apparatus first end swings away from the neck toward the golfer's shoulder as the swing concludes.

Background of the Invention

Different putter structures and methods are shown in the prior art. Included are the following U. S. Patents: 5,209,474 to Voyer; 5,342,055 to Diley; 5,529,306 to Staats et al.; 5,893,803 to Leadbetter et al.; 6,595,865 to Stitz; 5,465,971 to Tischler; 5,520,392 to Foresi et al.; 5,649,870 to Harrison; 6,572,486 to Sweinhart; 6,533,676 to D'Angelo et al.; 6,491,591 to Schuster; 6,350,207 to Arcuri; 5,665,007 to Tatum; 5,584,768 to Lee; and 4,461,479 to Mitchell.

The patents referred to herein are provided herewith in an Information Disclosure Statement in accordance with 37 CFR 1.97.

Summary of the Invention

Prior art reveal many golf putters including the "long putter" and putters with a handle portion residing in the arm pit, stomach or chest during the putting swing. The putter and putter training apparatus disclosed herein is a "neck putter" used such that the putter shaft, distal from the putter head, remains gently pressed against the golfer's neck during the execution of a proper putting stroke. The position of the putter shaft, distal from the golf club head, gives immediate feedback to the golfer on performing the "correct" and "incorrect" putting stroke before the ball is struck. Movement of the putter shaft, distal from the putter head and proximal and gently

1 pressed against the golfer's neck, away from the neck and toward the shoulder signals
2 the golfer that the golfer's wrists have improperly broken resulting in the putter shaft
3 falling away from the neck, or in falling off the neck during the putting stroke. The
4 golfer be trained, by use of the putter and or the putting training apparatus to stop
5 making an "incorrect" putting stroke, which results in a bad putt, and to make a
6 "correct" stroke.

7 The "neck putter" is longer than the "long putter" expected to be in the 60" to
8 72" length range. The training apparatus, the preferred embodiment of the invention,
9 is an alternate to the putter and is used for training in addition to the putter. The
10 training apparatus is an attachment, generally measuring approximately 36" in length,
11 which, in the preferred embodiment is received at the grip clip means by an existing
12 putter shaft, slipped up the shaft such that the grip clip means is affixed by a friction
13 fit at the golf putter grip. Alternative means to the grip clip means illustrated will be
14 recognized by those of ordinary skills in the attaching and affixing arts for the
15 temporary attachment of the training apparatus at the putter grip by connecting the
16 grip clip or connecting means to a putter primarily at the putter grip.

17 The "neck putter" and training apparatus train the golfer to perform a more
18 effective putting stroke achieved from muscle memory accomplished through
19 repetition. Additionally, the "neck putter" principle is defined by keeping the putter
20 pressed gently against the neck at all times during application of the putting stroke.
21 This provides the user with an effective tool for enhancing the Stability, Tempo, and
22 Pace (STP) required for an overall improved putting stroke.

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24 Brief Description of the Drawings

25 The foregoing and other features and advantages of the present invention will
26 become more readily appreciated as the same become better understood by reference
27 to the following detailed description of the preferred embodiment of the invention
28 when taken in conjunction with the accompanying drawings, wherein:

29 Fig. 1 is a perspective drawing showing the golf apparatus and golf putter in
30 combination where the apparatus first end is in contact with the golfer's neck and the
grip clip means (40) is affixed by affixing means at the golf putter grip.

1 Fig. 2 illustrates the golf apparatus (5) showing the grip clip means (40).

Fig. 3 is a detail from Fig. 2 illustrating the grip clip (40) showing the grip clip first end (50), grip clip first end dimension D1 (52), grip clip second end (60), grip clip slot (65) and grip clip slot dimension D5 (66).

Fig. 4 illustrates the grip clip (40), as seen in Fig. 3, viewing from the Grip clip second end (60).

Fig. 5 illustrates the process of interconnecting the golf apparatus (5) with a golf putter (70) where the grip clip slot dimension D5 (66) is greater than the putter shaft dimension D4 (54) allowing the tubular grip clip (40) to receive the putter shaft (72). The apparatus (5) and the tubular grip clip (40) slides on the putter shaft (72) toward the golf putter first end (80) and is affixed by a grip affixing means at the golf putter grip (75) or alternatively the grip clip means (40) is placed and affixed by clip affixing means at the golf putter grip (75)..

Fig. 6 illustrates the grip clip (40) showing a hinge means (42) affixed by hinge affixing means to the apparatus shaft (10) at the apparatus second end (30).

Fig. 7 illustrates the neck putter (200) in position against the golfer's neck in preparation for the putter stroke.

18 Fig. 8 is a front elevation of the neck putter (200) showing the neck putter
19 shaft length adjustment means (250).

20 Fig. 9 is a side elevation of the neck putter (200).

Fig. 10 illustrates a golfer utilizing the apparatus and golf putter in combination (1).

Fig. 11 shows the golfer utilizing the neck putter (200) where the apparatus has moved away from the golfer's neck indicating an incorrect golf putting stroke.

Fig. 12 shows the apparatus and golf putter in combination (1) demonstrating the grip clip (40) at the putter grip (80) in position for use by the golfer.

27 Fig. 13 shows the neck putter (200) with a neck putter grip (230).

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29 Detailed Description

30 The training apparatus with putter (1) and the apparatus (5), illustrated at
Figures 1 through 6, 10 and 12 show apparatus upper shaft (10), the apparatus upper

1 shaft first end (20), the counter weight (22), the apparatus upper shaft second end
2 (30), grip clip means (40) with hinge means (42). Seen at the grip clip means (40) is
3 the grip clip first end (50) having a grip clip first end dimension D1 (52), a grip clip
4 second end (60) having a grip clip second end dimension D2 (62) and a grip clip slot
5 (65) having a grip clip slot dimension D5 (66). Seen in figures 1, 5 and 10 is a golf
6 putter (70) having a golf putter shaft (72), a golf putter first end (80), a golf putter
7 second end (90) and a golf putter head (100). The golf putter shaft (72) has a putter
8 shaft dimension D3 (54).

9 The preferred embodiment of the invention is the training apparatus and golf
10 putter (1) comprising an apparatus (5) having an apparatus upper shaft (10). The
11 apparatus upper shaft (10) having an apparatus upper shaft first end (20) and an
12 apparatus upper shaft second end (30). Grip clip means (40) affixed to the apparatus
13 upper shaft (10) at the apparatus upper shaft second end (30) by hinge means (42). A
14 golf putter (70) having a golf putter lower shaft (72). The golf putter (70) having a
15 golf putter lower shaft first end (80) and a golf putter lower shaft second end (90). A
16 golf putter head (100) affixed by golf club head affixing means at the golf putter
17 lower shaft second end (90). A golf putter grip (75) is received at the golf putter
18 lower shaft first end (80). The golf putter grip (75) having a dimension D4 (64)
19 greater than a putter lower shaft (72) dimension D3 (54). Dimensions are generally
20 inside or outside diameters where the structures are generally tubular and circular in
21 cross section. However, where not circular in cross section and where the structure is
22 tubular, the dimension(s) will interrelate in illustrating the movement of the grip clip
23 (40), generally tubular in structure, from a lower portion of the golf putter lower shaft
24 (72) toward and in contact with the golf putter grip (75). It will be recognized that
25 golf club tubular shafts are generally tapered from a smaller outside diameter
26 proximal the golf club head to a greater outside diameter proximal the golf club grip
27 (75) and that the golf club grip (75) will generally have a greater outside diameter or
28 dimension, where not circular in cross section, than the golf putter lower shaft (72).

29 The apparatus upper shaft (10), golf putter lower shaft and golf putter grip
30 (75) are generally tubular having a variety of cross sections. The grip clip means (40)
generally comprises a tubular member means (42) having a grip clip first end (50)

1 and a grip clip second end (60). The tubular member means (42) having a hinge
2 means (42) affixed by hinge affixing means intermediate the grip clip first end (50)
3 and the grip clip second end (60) at the tubular member means wall (43) at the outer
4 surface (44). The hinge means (42) affixed by hinge affixing means at the apparatus
5 second end (30) providing hinge interaction between the apparatus shaft (10) and the
6 grip clip means (40). Hinge affixing means may be by formation of hinge leaves via
7 injection molding or metal formation from rigid materials including plastics, metals
8 and other equivalent materials; hinge means regarding the rotation of one hinge leaf
9 relative to another hinge leaf may be by a bolt received via apertures in the hinge leaf
10 aligned with apertures in the apparatus upper shaft (10) proximal the apparatus
11 second end (30) and secured by a nut or by a leaf structure formed in a generally
12 tubular form which is received by the apparatus second end (30) and which has hinge
13 interconnection means relative to a second leaf structure illustrated here generally as
14 a grip clip (40). Shaft means, in all embodiments, are generally a rigid material,
15 tubular in structure formed from plastics, composite materials, metals and other
16 equivalent materials.

17 A grip clip slot (65) in the wall (43) from the grip clip first end (20) to the
18 grip clip second end (30) wherein the slot (65) has a grip clip slot dimension D5 (66)
19 which is greater than a putter shaft dimension D3 (54) and which is sized to receive a
20 golf putter shaft (72) intermediate the golf putter head (100) and the golf putter grip
21 (75). The grip clip slot dimension D5 (66) has a dimension less than the dimension
22 of the golf putter grip dimension D4 (64). The grip clip first end dimension D1 (52)
23 is less than the grip clip second end dimension D2 (62). The grip clip first end
24 dimension D1 (52) and the grip clip second end dimension D2 (62) is sized to receive
25 the golf putter grip (75) and to be affixed by grip affixing means at the golf putter
26 grip (75). The grip affixing means to affix the grip clip means (40) includes friction
27 fitting by the fact of the grip clip first end dimension D1 (52) being less than the grip
28 clip second end dimension D2 (62) and the golf putter grip dimension D4 (64),
29 proximal the apparatus first end (20) being greater than the grip clip second end
30 dimension D2 (62). The grip affixing means to affix the grip clip means (40) also
includes other forms of gripping including a spring secured clam shell structure

1 allowing the grip clip means (40) to be opened to allow the grip clip slot (65) to
2 receive a golf putter grip (75). Other similar friction affixing, clamp affixing
3 structures and other strictures will be viewed by those of ordinary skill in the art as
4 equivalent. The apparatus (5) at the grip clip slot (65) will receive either the
5 apparatus shaft (10) to slide up the apparatus shaft (10) toward the apparatus first end
6 (20) and receive and be affixed at the golf putter grip (75) or the grip clip slot (65)
7 will receive the golf putter grip (75) and be affixed by affixing means for use in
8 putting. The apparatus (5) at the apparatus first end (20) will be placed by the golfer
9 against the golfer's neck (21). The golfer will detect the position of the apparatus
10 first end (20) relative to the golfer's neck (21) and when sensing that the apparatus
11 first end (20) has moved away from the neck (21) and toward the golfer's shoulder
12 (22) will realize that the golf stroke has been incorrectly executed. In the alternative,
13 the golfer, in realizing that the apparatus first end (20) has remained in contact with
14 the golfer's neck (21) throughout the putting stroke, will realize that the golf stroke
15 has been correctly executed.

16 An embodiment of the invention is a neck putter (200) having an upper putter
17 shaft (205) having an upper putter shaft terminus (206) and a lower putter shaft (207).
18 The upper putter shaft (205) and lower putter shaft (207) are, in the preferred
19 embodiment, comprised of tubular means but may be comprised of shaft means
20 including plastics, composite materials, metals and other shaft materials recognized
21 by those of ordinary skills in the golfing arts regarding golf shafts. The upper putter
22 shaft (205) has an upper putter shaft first end (210) and an upper putter shaft second
23 end (211). The lower putter shaft (207) has a lower putter shaft first end (212) and a
24 lower putter shaft second end (220). A neck putter head (240) is affixed by golf
25 putter and golf head affixing means at the lower putter shaft second end (220). The
26 neck upper putter shaft first end (210) is distal from the upper putter shaft second end
27 (211). A neck putter grip (230) means, generally tubular, is received by the upper
28 putter shaft (205) at the upper putter shaft second end (211) and by the lower putter
29 shaft (207) at the lower putter shaft first end (212). A neck putter second grip (235)
30 means may be received by the upper putter shaft (205) intermediate the upper putter
shaft first end (210) and the putter grip (230). Grip means (230) and (235) comprises

1 a covering, generally tubular, or surface which is grasped by the golfer in operating
2 the putter and in performing the golf stroke and may be composed of plastic, leather,
3 foams and other materials commonly used in forming golf club grips.

4 The lower shaft (207) may be formed in two pieces comprising a lower shaft
5 upper portion (208) and a lower shaft lower portion (209) for the purpose of allowing
6 the lower putter shaft (207) to be adjusted in length by the lower shaft upper portion
7 (208) to be received into or to receive the lower shaft lower portion (209) to allow
8 adjustment of the length of the lower shaft (207) by use of a neck putter shaft length
9 adjustment means (250). Neck putter lower shaft length adjustment means (250) may
10 be comprised of allen screw asserting force from the lower shaft upper portion (208)
11 against the lower shaft lower portion (209), a screw coupling received by threaded
12 means at the lower shaft upper portion terminus (206) or the lower putter shaft (207)
13 distal from the neck putter second end (220) which compresses either the lower shaft
14 upper portion (208) proximal the lower shaft upper portion terminus (206) or the
15 lower shaft lower portion (209) against the other. Other putter shaft length
16 adjustment means (250) will be recognized by those of ordinary skills in the affixing
17 arts to be the equivalent to those recited.

18 It will be recognized that rules of golf club construction will be observed
19 including, but not limited to, the angle of presentation between the golf putter head
20 and the lower putter shaft (207) and that the moveable portions of the indicated
21 structure including the putter shaft length adjustment means (250) will be fixed by a
22 means which will make adjustment during play difficult. The neck putter second
23 grip (235) is provided to allow the golfer an alternative means of holding the neck
24 putter during the putter stroke. The neck putter (200) is adjusted to a length such that
25 the upper putter shaft (205) proximal the neck putter first end (210) will be positioned
26 proximal to and touching the golfer's neck during the putting stroke. A counter
27 weight (202) may form or be placed within the upper putter shaft (205) proximal the
28 neck putter first end (210).

29 While a preferred embodiment of the present invention has been shown and
30 described, it will be apparent to those skilled in the art that many changes and
modifications may be made without departing from the invention in its broader

1 aspects.' The appended claims are therefore intended to cover all such changes and
2 modifications as fall within the true spirit and scope of the invention.

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